

CLAIMS

5 The embodiments of the invention in which an exclusive property or
privilege is claimed are defined as follows:

1. A stabilized scintillation detector, comprising:
 - (a) an LED that periodically produces a light pulse;
 - (b) a beam splitter that impinges some of said light pulse on a
10 photodetector and on a photomultiplier;
 - (c) a scintillator that receives radiation and is coupled to said
photomultiplier; and
 - (d) a control unit that receives signals from said photodetector and said
15 photomultiplier representative of said light pulse received by said photodetector
and said photomultiplier and receives a signal representative of temperature of
said scintillator and outputs, in part, a signal to said photomultiplier to stabilize
said photomultiplier.
2. A method of using a scintillation detector, comprising:
 - 20 (a) periodically producing a light pulse;
 - (b) impinging some of said light pulse on a photodetector and on a
photomultiplier;
 - (c) using a scintillator to receive radiation, said scintillator being to said
photomultiplier; and
 - 25 (d) receiving signals from said photodetector and said photomultiplier
representative of said light pulse received by said photodetector and said
photomultiplier and receiving a signal representative of temperature of said
scintillator and outputting, in part, a signal to said photomultiplier to stabilize
said photomultiplier.